DOCUMENT RESUME

ED 416 058 RC 021 387

AUTHOR	Henderson, Bob; Mehta, Sonali; Elrick, Michael
TITLE	A Practitioner's Look at Research: Experientially Based Practitioner-Friendly Program Assessment Measurement Tools.
PUB DATE	1996-09-00
NOTE	7p.; In: Spawning New Ideas: A Cycle of Discovery; see RC 021 376.
PUB TYPE	Reports - Descriptive (141) -- Speeches/Meeting Papers (150)
EDRS PRICE	MF01/PC01 Plus Postage.
DESCRIPTORS	Action Research; Classroom Research; *Concept Mapping; *Evaluation Methods; Experiential Learning; Foreign Countries; High Schools; *Outdoor Education; *Program Evaluation; Student Attitudes; *Teacher Researchers
IDENTIFIERS	Ontario; Teacher Researcher Relationship

ABSTRACT

School-based outdoor and experiential programs face an increasing demand from outside interests for research-based accountability. This paper suggests that both research and practice are strengthened by researcher-practitioner partnerships and by practitioners conducting their own research. Three modest qualitative research designs are explored as viable tools for practitioner research. In the first study, concept mapping was used to examine students' experiences in the conventional school setting and in the Community Environmental Leadership Programme (CELP), an integrated outdoor experiential program in a Guelph (Ontario, Canada) high school. Students constructed concept maps of their perspectives on schooling before and after CELP. Concept maps are unique in providing researchers with complex information for program assessment while remaining a student-controlled activity. This tool's effectiveness may lie in the fact that concept maps allow students to reflect on their experiences with the personal language that they have constructed. The following year, CELP students wrote short stories about themselves and school, at the beginning and end of the program. With both approaches, student responses were honest and stimulating for the teacher, but concept mapping appeared to be more fun and more liberating for students than the story approach. In the third study, an experiential practitioner who had collected student journal work for 10 years realized that the work was data and could be used to save his program from cutbacks. (SV)

****
* Reproductions supplied by EDRS are the best that can be made *
* from the original document. *
****

ED 416 058

A PRACTITIONER'S LOOK AT RESEARCH: EXPERIENTIALLY BASED PRACTITIONER-FRIENDLY PROGRAM ASSESSMENT MEASUREMENT TOOLS

Bob Henderson
Associate Professor, Department of Kinesiology, McMaster University, Hamilton, Ontario, Canada L8S 4K1

Sonali Mehta
Arts and Science Program, McMaster University, Hamilton, Ontario Canada L8S 4K1

Michael Elrick
Centennial Collegiate Vocational Institute (C.E.L.P.), Community Environmental Leadership Program, 289 College Ave. W., Guelph, Ontario Canada N1G 1S9

U.S. DEPARTMENT OF EDUCATION
Office of Educational Research and Improvement
EDUCATIONAL RESOURCES INFORMATION CENTER (ERIC)

✓ This document has been reproduced as received from the person or organization originating it.

☐ Minor changes have been made to improve reproduction quality.

• Points of view or opinions stated in this document do not necessarily represent official OERI position or policy.

B. Baker

BEST COPY AVAILABLE

RC 021 387

A PRACTITIONER'S LOOK AT RESEARCH: EXPERIENTIALLY BASED PRACTITIONER-FRIENDLY PROGRAM ASSESSMENT MEASUREMENT TOOLS

Bob Henderson
Associate Professor, Department of Kinesiology, McMaster University, Hamilton, Ontario, Canada L8S 4K1

Sonali Mehta
Arts and Science Program, McMaster University, Hamilton, Ontario Canada L8S 4K1

Michael Elrick
Centennial Collegiate Vocational Institute (C.E.L.P.), Community Environmental Leadership Program, 289 College Ave. W., Guelph, Ontario Canada N1G 1S9

Abstract
Three modest research studies of experiential education programs in school settings (secondary and university) will be explored in terms of political relevance and for the meaning of the findings themselves. The research function highlights that: 1) practitioners can and should be engaged in research inquiry for accountability to outside interests; 2) that finding can inform practice in meaningful ways, particularly if responses are student-driven; and 3) that the process can be FUN, easier than you think and "experiential" for practitioners.

Particularly for school based experiential programs, there is an ever increasing need from outside interests for programs to be accountable for "what is really going on here" and "is it worth doing anyway"? Typically, practitioners avoid conducting their own modest research of their program offerings thinking that the research design will be spurious to programming concerns, that they do not have the skills or time, or that they likely already have the insights to be determined. Similarly, the data collected is easily thought to be simplistic relative to the complexity of the human qualities engaged in the experiential learning process or too manipulative of the client/student such that results reflect what the research is seeking, not what the participant actually experiences. We know this because we have believed each of these opinions in the past and we have shared them in the "supportive" company of other experiential educators. Thus we, like many, have avoided any notion of accountability or deeper understandings derived from systematic research inquiry. The avoidance can possibly be judged from a researcher's position as a defense mechanism. Research is avoided because it, for some people, is difficult, time consuming, and not easy to understand.

Note already that we have set up a clear binary between so-called practitioners and researchers in the field. Note also the readily applied use of a disparaging tone in judging each other. Such a divisive typology is common in our professional language and understanding of our field. In some settings, for some practice or research, the split may be necessary but certainly a split of function need not and should not always be the case. A general lack of understanding about function seems to inevitably lead to disparaging tones that weaken our profession's conduct overall. There is a strengthening of both research and practice in, 1) research/practitioner partnerships and 2) practitioners conducting their own research projects. The intent of this presentation is to highlight examples of these two relational efforts, so that 1) "practitioners" will be more able to engage in research inquiry for the gains to their programs and professional understanding, and 2) so that researchers may encourage partnerships as a healthier praxis and/or foster practitioner-driven research inquiry. We are advocating a union of purpose that (with tongue in cheek) might be thought of as encouraging the role of the "practi-searcher." There will, and should always be, separate researchers and practitioners, but there ought to be a wiser pairing of these functions in a great many cases so that there will be a needed proliferation of experiential education assessment that is most meaningful to students, teachers, and administrators alike.

Firstly, let us share definitions of research that work for our purpose in that they demystify a lofty status of "research" that may discourage educators away from any systematic research inquiry. When we ask questions of our practice we begin the research process. "Research is formalized curiosity. It is poking

RC 021387

BEST COPY AVAILABLE

and prying with purpose. It is a seeking that he who wishes may know the cosmic secrets of the world and they that dwell there in" (Hurston, 1942). To be curious with purpose is to ask clear questions, to have problems. "Research can be successful only if the problem is good...For to see a problem is to see something that is hidden" (Polanyi, 1966, 21). Finally, research is meant for public scrutiny. As Carr and Kemmis state, research is "systematic inquiry made public for criticism and utilization within a particular research tradition" (1983). The research tradition employed in the three studies here is an interpretive or naturalistic qualitative tradition (Lincoln and Guba, 1985). This means that we are seeking respondents' "word" statistics in an empirical (derived from experience based) tradition.

The Research Studies as Program Assessment

Three modest qualitative research designs will be explored as viable tools for practitioners to employ. Also shared are results that are brought immediately back to inform practice and brought forward to promote accountability. The three designs involve school and university experiential "unconventional" programs readily identified as fringe components to standard curriculum. The research designs readily lend themselves to practitioner/researcher partnerships or more ideally to developing practitioners as researchers. We use the word "modest" research designs because, as examples, each of the three involve relatively simple strategies for gathering and analyzing practitioner-driven, student-given data. As practitioners (turn researchers) ourselves, we feel the studies are elegant in their simplicity. For these proceedings, we will only deal with one study in any depth.

Exploring Notions of Schooling: Using Concept Maps for a High School Integrated Curriculum Program Assessment

Concept mapping was employed to explore students' experiences in the conventional school setting and in the Community Environmental Leadership Programme (C.E.L.P.). This integrated curriculum program, run from Centennial Collegiate and Vocational Institute in Guelph, Ontario, is a four-credit package with an emphasis on outdoor experiential education for grades 11-12. Each of the students completed two concept maps for this study: one relating their perspective on schooling in the conventional setting (pre-C.E.L.P.), and the second referring to schooling during C.E.L.P. The pre-C.E.L.P. map was constructed at the program's onset, while the C.E.L.P. concept map was done at the end of the programme. Concept maps are a unique tool in that they can provide the researcher with complex information to ultimately assess programme effectiveness while remaining a student controlled activity. A concept map represents a series of relationships. The map begins from a seed concept. Related concepts are then strung from the seed concept, thus creating conceptual strands which radiate outwards. Hence, it is schematic device that encodes in its framework sets of linked concepts (Novak and Gowin, 1984).

After introducing concepts as the mental images we have for words, the researchers stated their goal as trying to understand what students themselves learn and understand about learning both in a conventional school and in the C.E.L.P. school setting, and to learn more about concept maps as a way to explore student meaning. To link their mental images, they could get more specific with each rung down the link, and they could use connecting words such as "where," "like," "sometimes," etc., to form the links. They were also able to cross link groups of words which were otherwise on separate branches. Finally, they could offer specific examples of events or objects on their maps. The same directions were repeated at the end of the program.

After scanning the maps, several concepts emerged consistently. The thematic concepts were: teachers, evaluation, and community. Each student's pre-C.E.L.P. (conventional schooling) and C.E.L.P. concept map was surveyed for the presence of concepts reflective of the aforementioned general themes. In addition, qualitative trends and sentiments evoked by the maps were recorded to round out the process. Another initial consideration was the physical layout of the concept map itself (i.e., linear vs. clustered or circular). While there was one clear structural metamorphosis from the pre-C.E.L.P. to C.E.L.P. map, this turned out to be an infrequent event. Also analyzed was the degree of cross-linking present in the map, but again, this was found to be erratic and did not contribute to the overall programme assessment. Given our limited space, we will only consider one of the three themes that dominated the students'

BEST COPY AVAILABLE

concept maps, that is the relationship of student to teacher. (For a complete report on the findings of this study, see Mehta and Henderson, *Pathways: The Ontario Journal of Outdoor Education*, July/Aug, 1996.)

The word *teacher* shows up in 12 of the 15 pre-C.E.L.P. concept maps. In contrast, the same word appears in only two of 15 C.E.L.P. maps. This is a significant change. To try to get at the sense in which the concept *teacher* is used on the maps, we looked to the words which followed *teacher* in that particular conceptual strand. Table 1 shows the frequency of the particular word used by students linked with teacher in the pre-C.E.L.P. concept map.

CONCEPT	# OF TIMES FOUND	CONCEPT	# OF TIMES FOUND
Evaluation	6	Clash	2
Rules	2	Administration	2
Caring	2	Authority	2
Boring	2	Confusion	1

Table 1: Concepts associated with teacher on pre-C.E.L.P. concept map

In addition to the concepts which directly followed *teacher*,, it is important to note the general gist of the branch on which the concept is found. Often the link is shared with *principals* and *administrators*, in essence reflecting the teacher as part of the institution. Another common grouping is of a mechanical nature - teachers amidst physical structures such as *classrooms, desks*, etc. Thirdly, several students put teachers on branches dealing with *low self-esteem* and *frustration*. Thus, from the responses, one could categorize students' perspective on teachers as one of reserved distance or seeing teachers as contributors to their perceived problems.

The absence of the teacher category on the C.E.L.P. concept map is dramatic. In the two instances where teachers are mentioned on the C.E.L.P. concept map, the following words are associated:

CONCEPT	# OF TIMES USED	CONCEPT	# OF TIMES USED
Friends	2	One-to-one	1
Evaluation	1	Close	1

Table 2: Concepts associated with teacher on post-C.E.L.P. concept map

A further three students refer to the teacher and assistant by their names (Mike Elrick and Ken) on the C.E.L.P. concept map. There are no references to institutionalized, mechanical or low self-esteem links which appear in the pre-C.E.L.P. maps. Their responses are more aptly captured in a pictorial reproduction of the links on their concept maps (e.g., teacher-friends-close).

We find the idea that teachers are simultaneously friends expressed through a majority of the concept maps. We believe that the omission of the word *teacher* is a purposeful acceptance of teachers into the broader categories of *friends* and *community*. Additionally, references to institutionalized or mechanical links, which appear in the pre-C.E.L.P. maps, are conspicuously absent on the C.E.L.P. concept maps.

While this study represents a small sample of students, it shows the potential residing in concept maps as a programme assessment tool. The effectiveness may lie in the very fact that concept maps allow the student to reflect on their experiences with the personal language which they have constructed. The pre-C.E.L.P. and C.E.L.P. concept maps prove to be a rich source of student data giving insights into the nature of conventional schooling and schooling in the context of the C.E.L.P. integrated curriculum program.

This is an example of a researcher/practitioner partnership. Together, the research design was created and presented to students. The teacher (Mike Elrick) added valuable insight as to how the project was

BEST COPY AVAILABLE

received, and he helped with the interpretations of the results. M.E. was not active in the analysis of the data because of his familiarity with the students. M.E. was excited by the concrete data, albeit a small sample size, and he was keen to continue the next year with a follow-up inquiry.

Exploring Notions of Schooling: Using Story for a High School Integrated Curriculum Program Assessment

The same pre and post program visits of the next year's C.E.L.P. students were conducted in co-ordination with M.E. We, researchers and practitioners, decided together to try another assessment tool that seemed equally easy to administer and open to students in terms of them choosing their concern. We elected to try a story approach (Connelly and Clandinin, 1990). A meeting two days prior to the students' class time set aside for writing their own story allowed for us to discuss what is meant by story. Their stories might take the form of a parable (once upon a time), a fictional account (created characters and circumstances), non-fictional (specific events and people). The stories might be general overviews or refer to specific moments. They would have 15-20 minutes to write a quick story. The stories (pre C.E.L.P. and post C.E.L.P.) were not evaluated in any way within the schooling content, and all work was anonymous. Students would have access to our final research report. Again, the experience of "schooling" pre and post C.E.L.P. was the theme of their responses. These conditions paralleled the earlier concept mapping project.

We did provide some structure so that we would have a strategy for analysis of their stories. Based on the earlier concept map work, we selected words that seemed most used by students, often in both positive and negative ways. Of the following 14 words, seven or eight were necessary to include in their telling: challenge, friends, teacher, change, responsibility, teaching, groups, boring, evaluation, community, trust, fun, conflict, learning. The analysis of the stories involved recording the words selected from the above list and how they were used. Key additional words and phrases were noted. The overall themes and approach to the stories were noted as were the use of person, first or third, and a W5 (where, when, who, why and how) was recorded. Analysis of the post C.E.L.P. story writing session was in process at the time of this writing so mentioning of results is not possible. (For a complete account of this research project, see *Pathways: The Ontario Journal of Outdoor Education* Sept/Oct, 1996). Initial feedback from M.E. suggested that the concept map approach for student generated data collection is preferable to the story approach. Many students complained that, they are "not good writers." Some cannot help but connect stories to schoolwork, to evaluation. In short, the concept mapping approach was more novel, more fun, and more liberating overall than the story approach.

With both approaches, we were struck by the honesty of students' responses and their ability to "cut to the chase." For the teachers, this was stimulating and useful. For researchers, it validates the simplicity of the research design. These studies showcase this integrated curriculum experience-based program as a positive alternative to "conventional" school, one that specifically fosters increased community spirit to the class setting, a healthier rapport between teachers and students, more valued school evaluation strategies, and an increased personal responsibility to others.

Over these two years, our intentions as researchers were simple; 1) to begin a partnership with a teacher of an integrated outdoor experiential curriculum program, 2) to produce useful data for the teacher who must be accountable for the questions "what is going on here" and "is it worth doing anyway," 3) to show the effectiveness of modest programme assessment measurement tools as significantly valuable for the time commitment required on the teachers' part and the possible intervention into the program time, and 4) to show that student-generated data from an open approach to research measurement tools has a significant place in experiential-based schooling programs. It is expected that a long term project of program assessment is now in place. This is both politically expedient and valuable for ongoing program review. Also noteworthy, it proved to be fun for all. A final study considered, involved a "practitioner" collecting student journal work over a 10-year period, discovering well into this time that the work was indeed data and could be used to save his experiential program from the proverbial cutback.

BEST COPY AVAILABLE

Karen Warren recently stated, "Unless we continue to create a theoretical base through developing ideas, a body of literature and a dialogue, we risk being solely technique oriented. Yet if we don't support practitioners who are at the leading edge of the potential for experience to transform education, we will end up with research lacking application and empty theory. The challenge is to develop partnership and balance" (1993, p. 19). We need to encourage and nurture practitioner/researcher partnerships and a healthy praxis of the "practi-searcher," the practitioner engaged in research of their own programs. We need to pursue such research to improve program quality certainly. But the time is among us when political considerations demand increased accountability. Accountability should come from a practitioner/researcher orientation where the politics are immediate and most understood.

References

Carr, W. & Kemmis, S. (1983). *Becoming Critical: Knowing Through Action Research*. Deakin, Australia: Deakin University Press.

Connelly, F.M. & Clandinin, D.J. (1990). Stories of Experience and Narrative Inquiry. *Educational Researcher*. June/July, 2-14.

Henderson, B. & Mehta, S. (1996). Using Story for a High School Integrated Curriculum Programme Assessment. *Pathways: The Ontario Journal of Outdoor Education*. Sept/Oct., in Press.

Hurston, Z.N. (1942). *Tracks on the Road*. NY:Harper Collins.

Lincoln, Y. & Guba, E. (1985). *Naturalistic Inquiry*. Beverly Hills, CA: Sage.

Mehta, S. & Henderson, B. (1996). Exploring Notions of Schooling: Using Concept Maps for a High School Integrated Curriculum Programme Assessment. *Pathways: The Ontario Journal of Outdoor Education*. July-Aug.

Novak, J. & Gowin, D. (1985). *Learning How to Learn*. Cambridge: Cambridge University Press.

Polanyi, M. (1966). *Tacit Dimension*. NY: Doubleday.

Warren, K. (1993). Interview. In *Horizon: Newsletter of the Association of Experiential Education*. Sept., 19-20.

Biographies

Dr. Henderson is a professor of Outdoor Experiential Education at McMaster University.

Sonali Mehta is a graduate of the Arts and Science Program at McMaster University.

Michael Elrick is a teacher at C.C.V.I., Guelph, Ontario.